

IN THE CLAIMS

Upon entry of the present amendment, the status of the claims will be as is shown below. This listing of claims replaces all previous versions and listings of claims in the present application.

Claims 1-10 (Cancelled)

11. (New) A data communication apparatus that exchanges a voice packet via an IP network, the apparatus comprising:

a data processor that executes a standard communication mode and a high-speed communication mode, the voice packet including non-voice data and being exchanged at a predetermined transfer rate via the IP network in the standard communication mode and at a rate faster than the predetermined transfer rate via the IP network in the high-speed communication mode, the standard communication mode and the high-speed communication mode being interchangeably executed;

an acceptor that obtains capability information of a remote apparatus in accordance with a predetermined communication protocol; and

a controller that selects the high-speed communication mode for execution based on a determination, using the capability information, that the remote apparatus is configured to execute the high-speed communication mode.

12. (New) The data communication apparatus according to claim 11, the data processor comprising:

an IP processor that decodes data in the exchanged voice packet; and

a modem that demodulates PCM data that is output from the IP processor.

13. (New) The data communication apparatus according to claim 12,
wherein the controller switches between the standard communication mode and
the high-speed communication mode, by adjusting a standard clock that synchronizes
mutual operations of the IP processor and the modem.

14. (New) The data communication apparatus according to claim 11,
wherein the data processor synchronizes a voice packet transmission operation of
the data communication apparatus and a voice packet reception operation of the remote
apparatus, upon receiving synchronization information from the remote apparatus, during
an execution of the high-speed communication mode.

15. (New) The data communication apparatus according to claim 11, further
comprising:

a notification unit that notifies the remote apparatus of capability information
regarding the standard communication mode and the high-speed communication mode,
when transmitting a connection request to the remote apparatus, in accordance with the
predetermined communication protocol.

16. (New) The data communication apparatus according to claim 11,
wherein the predetermined communication protocol is Session Initiation Protocol.

17. (New) The data communication apparatus according to claim 11, wherein the non-voice data stored in the voice packet is facsimile data.

18. (New) A data communication method that exchanges a voice packet via an IP network, the method comprising:

obtaining capability information of a remote apparatus in accordance with a predetermined communication protocol, the capability information indicating whether the remote apparatus is configured to execute a high-speed communication mode in which the voice packet, including non-voice data, is exchanged at a predetermined transfer rate via the IP network;

determining, using the capability information, whether the remote apparatus is configured to execute the high-speed communication mode in which the voice packet is exchanged at the predetermined transfer rate;

transferring the voice packet in the high-speed communication mode based on determining that the remote apparatus is configured to execute the high-speed communication mode; and

transferring the voice packet in a standard communication mode based on determining that the remote apparatus is not configured to execute the high-speed communication mode, the voice packet being exchanged in the standard communication mode at a standard transfer rate lower than the predetermined transfer rate.

19. (New) The data communication method according to claim 18, wherein the non-voice data is facsimile data.

20. (New) The data communication method according to claim 19, further comprising:

synchronizing a voice packet transmission operation of the transmitter and a voice packet reception operation of the remote apparatus.

21. (New) A facsimile apparatus that communicates with a terminal via an IP network, the facsimile apparatus comprising:

a transmitter that transmits a voice packet to the terminal via the IP network;

a receiver that receives capability information of the terminal from the terminal via the IP network, the capability information indicating whether the terminal is configured to execute a high-speed communication mode in which the voice packet is exchanged at a first transfer rate;

a VoIP processor that performs a first data conversion between the voice packet and voice data;

a modem that performs a second data conversion between the voice data and facsimile data; and

a controller that determines, using the capability information, whether the terminal is configured to execute the high speed communication mode,

wherein the transmitter transmits the voice packet at the first transfer rate when the controller determines that the terminal is configured to execute the high-speed communication mode, and transmits the voice packet at a second transfer rate, lower than

the first transfer rate, when the controller determines that the terminal is not configured to execute the high-speed communication mode.

22. (New) The facsimile apparatus according to claim 21,
wherein the transmitter transmits a request for a media session establishment to the terminal in accordance with a predetermined protocol, and
wherein the capability information is transmitted from the terminal in response to the request.